What is claimed is:

1. An organic semiconductor composition comprising particles and an organic semiconducting compound combining with the particles.

2. The organic semiconductor composition of claim 1, wherein the particles are metal particles.

3. The organic semiconductor composition of claim 1, wherein the organic semiconducting compound combines with the particles through a sulfide group, a disulfide group, a carboxyl group, a sulfonic acid group, a sulfinic acid group, a phosphonic acid group, or a phosphate group.

4. The organic semiconductor composition of claim 3, wherein the organic semiconducting compound combines with the particles through a sulfide group.

5. The organic semiconductor composition of claim 1, wherein the organic semiconducting compound is a π-conjugated polymer or oligomer.

6. The organic semiconductor composition of claim 5, wherein the π-conjugated polymer or oligomer is a polythiophene derivative.

7. The organic semiconductor composition of claim 6, wherein the polythiophene derivative is a regioregular poly(3-alkylthiophene).

8. The organic semiconductor composition of claim 7, wherein the alkyl group of the regioregular poly(3-alkylthiophene) is an alkyl group having a carbon atom number of from 4 to 15.

9. The organic semiconductor composition of claim 7, wherein the regioregular poly(3-alkylthiophene) combining with the particles is dispersed in a solvent.

10. The organic semiconductor composition of claim 7, wherein the solvent can dissolve the regioregular poly(3-alkylthiophene).

11. The organic semiconductor composition of claim 7, wherein the regioregular poly(3-alkylthiophene) combining with the particles is a mixture of first particles, with which poly(5-substituted 3-alkylthiophene) combines through the substituent of the 5-position, and second particles, with which poly(2-substituted 3-alkylthiophene) combines through the substituent of the 2-position.

12. The organic semiconductor composition of claim 11, wherein the first particles, with which poly(5-substituted 3-alkylthiophene) combines through the substituent of the 5-

position, are dispersed in a first solvent to obtain a first dispersion, second particles, with which poly(2-substituted 3-alkylthiophene) combines through the substituent of the 2-position, are dispersed in a second solvent to obtain a second dispersion, and both dispersions are mixed.

13. The organic semiconductor composition of claim 5, wherein the π-conjugated polymer or oligomer is a polyporphyrin derivative.

14. The organic semiconductor composition of claim 13, wherein the polyporphyrin derivative is poly(imidazolylporphyrin-metal complex).

15. A semiconductor element which is a photosensor comprising an organic semiconductor layer and two or more electrodes contacting it or an organic thin-film transistor comprising a support, a gate electrode and a gate insulation layer provided on the support, an organic semiconductor layer provided on the gate insulation layer, and a source electrode and a drain electrode each contacting the organic semiconductor layer, wherein the organic semiconductor layer contains an organic semiconductor composition comprising particles and an organic semiconducting compound combining with the particles.

16. The semiconductor element of claim 15, wherein the particles are metal particles.

17. The semiconductor element of claim 15, wherein the organic semiconducting compound combines with the particles through a sulfide group, a disulfide group, a carboxyl group, a sulfonic acid group, a sulfinic acid group, a phosphonic acid group, or a phosphate group.

18. The semiconductor element of claim 17, wherein the organic semiconducting compound combines with the particles through a sulfide group.

19. The semiconductor element of claim 15, wherein the organic semiconducting compound is a π-conjugated polymer or oligomer.

20. The semiconductor element of claim 19, wherein the π-conjugated polymer or oligomer is a polythiophene derivative.

21. The semiconductor element of claim 20, wherein the polythiophene derivative is a regioregular poly(3-alkylthiophene).

22. The semiconductor element of claim 21, wherein the alkyl group of the regioregular poly(3-alkylthiophene) is an alkyl group having a carbon atom number of from 4 to 15.

23. The semiconductor element of claim 21, wherein the regioregular poly(3-alkylthiophene) combining with the particles is dispersed in a solvent.

24. The semiconductor element of claim 23, wherein the solvent can dissolve the regioregular poly(3-alkylthiophene).

25. The semiconductor element of claim 21, wherein the regioregular poly(3-alkylthiophene) combining with the particles is a mixture of first particles, with which poly(5-substituted 3-alkylthiophene) combines through the substituent of the 5-position, and second particles, with which poly(2-substituted 3-alkylthiophene) combines through the substituent of the 2-position.

26. The semiconductor element of claim 25, wherein the first particles, with which poly(5-substituted 3-alkylthiophene) combines through the substituent of the 5-position, are dispersed in a first solvent to obtain a first dispersion, second particles, with which poly(2-substituted 3-alkylthiophene) combines through the substituent of the 2-position, are dispersed in a second solvent to obtain a second dispersion, and both dispersions are mixed.

27. The semiconductor element of claim 19, wherein the π-conjugated polymer or oligomer is a polyporphyrin derivative.

28. The semiconductor element of claim 27, wherein the polyporphyrin derivative is poly(imidazolylporphyrin-metal complex).

29. A manufacturing method of an organic semiconductor composition comprises the steps of:

dispersing, in a solvent, particles with which an organic semiconducting monomer having a linkage group combines through the linkage group to obtain a dispersion; and adding to the dispersion a solution of an organic semiconducting dimer, whereby the monomer and the dimer are located on the surface of the particles and a polymer of the monomer is formed between the particles.

30. The manufacturing method of claim 29, wherein the particles are metal particles.

31. The manufacturing method of claim 29, wherein the organic semiconducting monomer combines with the particles through a sulfide group, a disulfide group, a carboxyl group, a sulfonic acid group, a sulfinic acid group, a phosphonic acid group, or a phosphate group.